

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the application:

LISTING OF CLAIMS:

1. (currently amended): A telecommunication router (~~TLK, RTS~~) connected to a termination link (~~TL~~) and comprising a processor (~~PROC~~) adapted to handle packets of data received from said link, the telecommunication router comprising:

~~characterized in that said telecommunication router further comprises~~ a plurality of queues (~~P0-P3~~) adapted to store packets of data ~~prior to be before~~ said packets of data are transferred to said processor (~~PROC~~); and

a packet classifier (~~CL~~) adapted to receive said packets of data from said termination link, to classify ~~the said~~ received packets of data according to predetermined types, and to forward each of said classified packets of data towards one queue ~~out of said plurality of queues~~, said one queue being selected according to the type of ~~the forwarded packet~~ each of said classified packets of data;

~~in that wherein~~ each of said predetermined types is associated to a predetermined priority; ~~and~~

~~in that~~ said processor is adapted to retrieve packets of data from the queues of said plurality according to predetermined priority rules; and

each queue of said plurality of queues is controlled by a queue manager adapted to discard packets coming from said packet classifier when a predetermined threshold filling level of the queue is reached.

2. (currently amended): The telecommunication router according to claim 1, ~~characterized in that~~wherein said processor (~~PROC~~) is adapted to retrieve packets of data from a queue associated to a ~~relative high~~relatively higher predetermined priority prior to ~~retrieve~~retrieving packets of data from another queue associated to a relatively lower predetermined priority.

3. (currently amended): The telecommunication router according to claim 1, ~~characterized in that~~wherein said packet classifier (~~CL~~) is adapted to estimate said predetermined priority by analyzing the content of a packet and to forward the analyzed packet to the queue corresponding to the estimated priority.

4. (canceled).

5. (currently amended): The telecommunication router according to claim 1~~claim 4~~, ~~characterized in that~~wherein each queue of said plurality of queues (~~P0-P3~~) may have a different predetermined threshold filling level(~~T0-T3~~).

6. (currently amended): The telecommunication router according to claim 1, ~~characterized in that~~wherein said processor (~~PROC~~) is adapted to retrieve packets of data from said queues according to the load of said processor.

7. (currently amended): The telecommunication router according to claim 1, ~~characterized in that~~ wherein a plurality of termination links (~~TL~~) are connected to said packet classifier (~~CL~~).

8. (currently amended): The telecommunication router according to claim 1, ~~characterized in that~~ wherein a plurality of processors (~~PROC~~) are adapted to retrieve packets of data from said queues.

9. (currently amended): The telecommunication router according to claim 1, ~~characterized in that~~ wherein said packet classifier (~~CL~~) is adapted to forward to an output port (~~OUT~~) of said telecommunication router (~~TLK, RTS~~) packets that are not intended to said processor (~~PROC~~).